

# BMHA Newsletter

BICYCLE MOBILE HAMS OF AMERICA



Volume 2 Number 4

Oct - Dec 1991

## BMHA NET....ON 20

### Autumn Update

The BMHA HF Net is still very much alive. It has been a little slim this summer with many of us not bicycling during net time, but I'm sure it will pick up a lot this fall and winter, as it did last year. I myself have been out on a bike trip on two occasions when it was net time. But one of those times was during RAGBRAI when I called the net from my motor home -- after a tough 80 mile day on the bike. (Pheew!) We had a good list of check-ins that day in spite of it being middle of summer.

The time of the HF net is still 2330 UTC on the 1st and 3rd Sunday of each month. We have moved the calling frequency slightly to accommodate a DX net that's close by. Look for me (NFDN) around 14.253 plus or minus the QRM. I usually point the beam towards the west at first and after taking those check-ins I work the stations to the east. I'm looking for a couple of helping stations on either coast to assist me in calling for check-ins and to relay comments.

One suggestion: I'd like the check-ins to give details about their bike antenna installations and to make more information available to others by mentioning their address. And of course these antenna ideas should be written up and sent on to Hartley for possible publication in the BMHA Newsletter. There are many good antenna schemes going untold.

I'll look for you on the net this fall as the days get shorter and cooler -- and maybe somewhat less than ideal for bike riding. Even if you can't hear me, we will have one of the net assistants pick you up and give you an opportunity to comment. So keep trying until we acknowledge your call.

In the meantime send me your comments or suggestions. Write to me at the address below or, better still, send me a message on packet. I'll answer as many messages as I can. My packet address is NFDN @ NFDN.NE. 73, and good pedalling!

---Mike Nicklaus, NFDN  
316 E. 32nd St.  
3. Sioux City, NE 68776



## EDITOR'S COLUMN

### The Struggle

As you can see, this issue (late as it is) is produced on my new PC, and handsomely laser-printed on an HP IIIp. Making the change from my old and friendly Tandy Model 100 laptop to this austere and devilish 386 clone has not been easy. I can say that I truly know the meaning of the word frustration. To use the well-worn cliché, I've been dragged, kicking and screaming, into the 20th century.

I'm using a program called *WORKS* that some of you might be familiar with. It has very effective tutorials or I would still be struggling to put out this issue. I'm sure you're all familiar with the way things go when it's the first time on each of the many operations. First you turn the PC, the maker, and your dealer; then you take a hack at the manual; finally you put in a frantic call to the helpline at MicroSoft.

**Router:** We're quite proud of the enclosed membership roster, it being the first time that we had ever worked on a database. I managed to create the form and my wife Jean, N0EOX, did the hard part: typing in the data. I think you'll find it to be an important part of your BMHA membership. It could lead you to conclude that you're a member of a rather select group.

**Packet:** With the next issue we plan to include the Packet Address List that we have been compiling. The aim is to show the "packet address" of all BMHA'ers, as an aid to communication between members. Most new members have given us this data on the latest BMHA questionnaire. At any rate, if you operate packet and want to be on the list, send in your packet address before November 15.

**Dayton '92:** The Forum co-chairman of the HareVenture assures me that they are saving a spot in the schedule for us. The decision will soon be made, and notice of the time and room of the BMHA Forum will be included in the next issue.

**Deadlines:** I think you'll agree that laser printing has given this newsletter an elegant look. You writers have just lost your last excuse: you can no longer say "I refuse to write for that shoddy-looking BMHA Newsletter". (Hi) I'd like to again invite all you bike-hams to send in your writings about your rigs, your home-beewings, your adventures, your experiences while bicycle-mobile. To those on assignment, please buckle down and send your stuff in. The next deadline: November 15.

---Hartley Alley, N4QA, Editor

# TRAVEL & ADVENTURE

## Hamming On The Open Road

Packing a few ham radios for fun and company, I took a 3000 mile solo bicycle trip this summer. My route went from Ann Arbor, Michigan north to the upper peninsula, then west through Wisconsin, Minnesota, North Dakota, Montana, the panhandle of Idaho and on to Washington, where my trip ended at my grandfather's house in Lynden, near the Canadian border. I took along this gear: an Icom IC-2AT for 2m, a 5 watt crystal-controlled 20m CW transmitter, and an AEA DXHandy for 10m SSB. I built a 20m to 10m receive converter to accompany the transmitter. For CW I used an electronic keyer, with push buttons attached to the handlebar. I used a boom microphone headset. I was only planning on using the radio when pedalling got monotonous, so it was just a sideline to the sightseeing I did.

20m CW while bicycle mobile was a first for me. I was so busy preparing for my trip that I didn't get a chance to test it out. I wasn't sure I'd get out with just a whip antenna on the bicycle. I tried it on Day One, and immediately made a few contacts. Satisfied that all was well, I turned it off and enjoyed the scenery for a few days. Unfortunately, old Sol didn't cooperate. A big string of solar flares made operation impossible or very difficult, once I made it past Michigan. CQ magazine said June 1991 was one of the worst months ever for shortwave propagation. Of course, the bulk of my trip was during June! I did manage to make a few contacts, however. 10m only opened up a few times. I made all of one contact on SSB (that was from North Dakota). I was really hoping to make a lot of contacts for Field Day. Band conditions previous to that fateful day seemed completely flat. I could hear a few weak signals. My suspicions got aroused when I could hear them work stations one after the other. I discovered I had a shorted coax cable on the receive converter! Somewhere along the road the solar flares subsided, but the short tricked me into thinking conditions were worse than they really were. I got the rig going again on the last day of Field Day and managed to make 10 contacts, so the weekend wasn't a complete failure. I took a picture of myself at the top of Washington Pass and sent it to QST with my Field Day results. Maybe they'll publish it.

My favorite 20m CW contact of the trip was with WN9U, who was running 2 watts output. After I returned from my trip and got his QSL card, I found out he's a fellow member of BMHA! I always get a charge out of the reaction I get when I tell people I'm bicycle mobile, especially on CW. I have a feeling a few of them don't believe me, since they don't acknowledge it. I've gotten more than one QSL card that said they didn't believe me till they got my QSL card — it has a picture of my bicycle on it.

The best part of a bicycle vacation is meeting people. After one long day in North Dakota, I got on a 2m repeater in Minot to chat a bit. I talked to a ham who runs a store in a shopping mall. He invited me over to his store to talk awhile — I was camped just outside of town. The next morning we met again over breakfast. He said he wanted to call the local paper and the TV station. I was skeptical I'd be newsworthy, but it must have been a slow news day. I got a spot on TV, and they

put me on the front page of the newspaper, with a big photo! A nice memento of my vacation. The campground I arrived at that evening said they were expecting me since they saw me on TV!

It's always nice to meet other bicyclists while en route. Outside of Pelican Rapids, Minnesota — the middle of nowhere — I saw a bicyclist ahead of me after I rounded a corner. I caught up the bicycle and caught up with him. We talked for a bit, then the inevitable question about the radio came up. "Is that a two way radio?" I told him yes, it's a ham radio. Usually when I say that, I get a blank stare and an "oh". I was more than a bit surprised when he said "Oh, well I'm WJ0Q". We wound up riding about 70 miles together that day. He showed me the sights around Fargo that only a ham operator could appreciate: the tall repeater towers. Unfortunately, they were all on top a steep hill that I had to climb!

The trip wasn't without it's usual problems. I got three flat tires (not bad, considering I was riding on racing tires), and my freewheel quit freewheeling after only 700 miles into the trip. (I managed to get a replacement after riding carefully for a day.) I started the trip with a bicycle generator to charge the battery. After about 1000 miles, it frum up. They just aren't made for that kind of abuse. Now the generator made AC, so I already had a bridge rectifier wired up. How was I going to drop 120 Volts AC down to 12V AC? The proverbial light bulb lit up above my head. That's it, I'll use a light bulb! I stopped at the next hardware store and bought a rough service 150W light bulb as a voltage-dropping resistor. In an hour the battery was charged up, and I was on the air again.

Was it worth hauling 9 pounds of ham radio 3000 miles on a bicycle? YOU BET! Despite miserable conditions on the shortwave bands, I still had a ball when it worked, and 2m can't be beat for introducing yourself to the locals.

—Russell Dwarshair, KB8U  
427 Barber Ave.  
Ann Arbor, MI 48103-2721

## Bicycle-Mobiling on US 40

"Hello Dan, I'm Bill Cooper." So this was Bill. After talking to him for over a year on 10 meters, we finally met face to face. After months of planning our trip was about to begin. Bill, KB7JEY, and I, KP9DI, were about to spend five days bicycle mobile. Our trip would take us from St. Louis, Missouri through Illinois, Indiana, and into Ohio. Questions went through my mind: Would I be able to pedal that far? Would Bill and I pedal at about the same pace? Would Bill and I get along for all those miles? To talk to him from my home QTH of Pekin, IL. to his QTH of Prescott, AZ is one thing. To pedal, eat, and talk together for five full days and nights is another. Would we get along? *You betcha!*

Since there are no bridges across the Mississippi River which allow bikes, my YL, Kim, KB9GQI, ferried us across to Alton, IL — and Bill and I were off on our trek.

*Dan Nelson (left) and Bill Cooper celebrating the end of a successful trip, at the Ohio state line on US 40. (photo, KF9DI)*

Our first day was great! It was a good get-acquainted, level-terrain, wind-at-our-backs day. We found many repeaters along US 40 which helped us communicate with other hams as we pedaled across the Midwest farm land.

We met many friendly helpful hams along the way. In Effingham, IL, monitoring 146.52 led to an eyeball with Don, N9KHW, who introduced us to other hams in town, and supplied us with some repeater maps which we used many times on the rest of our trip. Thanks, Don! Thanks also to the many hams around the Terre Haute, IN area for making the miles go faster. In eastern Indiana we met up with Fran, W9ML, whose conversation made our ride more enjoyable. Fran's repeater also came in very handy.

The things I remember most about this trip were the ice tea, (Bill), and the Diet Coke, (me), breaks in the small towns along our route. Sitting in cafes and coffee shops many people would ask us questions about where we were going, and why do you guys have radios on your bikes? In some of the small towns we became instant celebrities!

Another note of interest was a surprise birthday party we had for Bill who turned 63 on our trip. I hope I am able to ride that many miles and have such a great outlook on life, when I am that age — I'm 34.

Our whole trip was on US 40, which sounds like it might not be a good route for cycling. But it's just the opposite. There's hardly any motor traffic, because all the heavy and fast traffic is bled off by Interstate 70, which runs parallel and close by. US 40 is ideal for bike touring. Because it's now a "back road", it's like going back in time. There are plenty of honey small towns to go through and plenty of accommodations. The motels are run by mom and pop, rather than a national chain, so we got a lot of personal attention — all along our 270 miles of US 40.

Well, the days went by quickly and soon it was time to say good-bye. With humps in our throats and a few tears in our eyes we had to separate at the Ohio border. Bill could keep going but I had run out of vacation time and had to get back to work. What a great trip! We're already talking about next year.

Thanks again to all the hams who helped us make the time and miles go faster. And thanks to ham radio in general, without which I never could have had such a great vacation, or met such a wonderful friend.

—Dan Nelson, KF9DI  
1414 Koch St  
Pekin, IL 61554



### **A Message from Canada, seen on packet by David Himelsen, N3GKB, Lititz, PA**

From VE3BUP @ VE3JF.#EON.ON.CAN.NA  
TO: BIKERS @ ALLBBS  
Subject: Bikenobile II

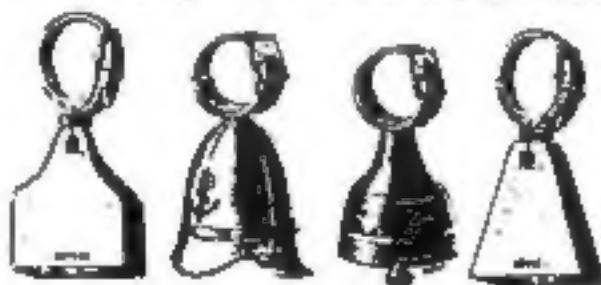
Hi fellow bike mobilers and would-be bike mobilers. This has been a great summer for biking in our area. In an earlier message I asked if there were others out there doing this, and I received a lot of replies from across North America, and one from the UK. There are at least 3 regulars in Ottawa with a few part timers on bike mobile. VE3PAK has even taken a stab at bike packet.

There are about 150 km of bike paths and routes here in Ottawa. I understand that there are some good ones in Montreal, where city council has allocated \$1 million for paths. On holiday in Prince Edward Island I was surprised at the number of people on bikes.

During this summer we heard a VE4 who was biking coast to coast and a VE3 who was involved in a Nova Scotia to Toronto bike rally for charity. VE3FFK bikes year round — for you warm weather types, that means in minus 25 celcius or colder. I go till the first snow fall that stays on the ground. It's not the cold but the slipping and sliding that stops me.

Any stories to share on biking and/or bike mobiling? I will compile a list of responses and send them out on the network in due course.

Keep on biking, 73 de Mike VE3BUP @ VE3JF Ottawa



## HELPING THE NON-HAMS

### MS 150 - "The Colorado Conquest"

The "Colorado Conquest" MS 150 is a 150 mile, two day bike ride from Denver to Pueblo, Colorado. For the six years of this fund-raiser for Multiple Sclerosis Colorado amateur radio operators have been active in providing communication support. The event is run each year on the first weekend in July, which, on the Eastern Slope of Colorado, makes for high temperatures that, fortunately, are tempered by low relative humidity.

The route for the first day headed South toward Colorado Springs, winding through the Black Forest, whose evergreens offer the only shade to be found in that part of Colorado's Eastern Plain. Once the route got to Colorado Springs, we headed West (uphill) to the foothills. This section was shaded but quite a workout due to the elevation change. Our uphill grind was rewarded by a fast downhill stretch through the scenic Garden of the Gods back to Colorado Springs and the Colorado College campus, where we over-nighted.

Day 2 began with breakfast at the campus followed by a ride past some of Colorado Spring's lovely old mansions. Once out of town, and after a couple of uphill stretches, we had a long pleasant downhill run through cool canyons, ending the day in Pueblo. In previous years the route went West and climbed past Canon City (home of Colorado's State Penitentiary) and on up to the Royal Gorge, a breathtaking (in more ways than one, when you're cycling) canyon on the Arkansas River. Unfortunately, the ride had gotten so popular (4,200 riders the year before) that the Royal Gorge area's narrow roads couldn't handle the increase in traffic. So this year we turned left at highway 50 and went downhill to the city of Pueblo.

The "Colorado Conquest" and the previous "Go For the Gorge" rides have been the most effective revenue-producing rides for Multiple Sclerosis - \$430,000 in 1991. Needless to say, with over 3,200 cyclists this is a very large scale event. Of the 1,500 volunteers who helped run the event 130 were ham radio operators. The ham volunteers primarily work at rest stops or ride with officials or in squads to provide communication support. This year three of us operated bicycle mobile (this was my third year to do so).

Due to the varying topography and the length of the route, we had to use four different repeaters to cover the entire two days. Because of high radio traffic volume, repeaters were dedicated for either routine traffic or medical/emergency traffic. Colorado is blessed with high elevation mountains which make excellent repeater sites - the state has more than 50 peaks that reach 14,000 feet. These repeaters provide wide coverage, except of course where other mountains block the RF.

On Day 1, we used the Colorado Repeater Association's 147.225 Conifer Mountain repeater for routine traffic until we got out of range near the Black Forest. At that time, we switched to 147.03 repeater in Colorado Springs. On Day 2 we began using the 147.03 repeater, switched to the 147.23 repeater in Canon City, and then back to 147.03 as we approached Pueblo. On both days we used the 146.97 repeater (located on Pikes Peak

at 14,000 feet) for medical emergency traffic. Net controls operated from base stations at Denver, Colorado Springs, and Pueblo.

We did find it beneficial using bicycle mobile operators. Although the bicycle mobiles could not cover ground as quickly as the sag vehicles, we were of course in much closer contact with the other riders. Oftentimes we'd notice a problem situation that the operators in cars would miss completely. This year on at least two occasions bicycle mobile operators were the first on the scene of an accident and thus able to immediately call for medical aid.

No special rigs or fancy antennas were needed by us bike-mobile hams - we used handie-talkies with quarter wave whips or rubber duck antennas. This setup worked satisfactorily, primarily because of the excellent coverage afforded by the high elevation of the repeaters.

My rig: Icom 2AT, Larson 1/4 wave flexible antenna, MFJ mini speaker-mike with earphone. The HT was carried in a handlebar bag with the antenna clipped to the outside of the bag - all carried nicely on my trusty Trek 400, 18 speed.

—Steve Johnson, N0AYE  
15 Manzanita  
Littleton, CO 80127

## TECHNICAL

### DXing World-Wide With An HT

Here in St Louis we're currently blessed with a repeater (442.000 + WB0WIL) that is not only effective as local UHF communication, but we can use DTMF (dual-tone multi-frequency) from our bicycles to access a remote-base Kenwood TS-440 HF that "connects" us from the bike to whatever HF station we would like to work.

As you can guess, the repeater is available 24 hrs a day, it's open. However, HF operations require prior knowledge of the DTMF codes. Without this extra piece of data, you'll be limited to approx. a 50 mi radius of St Louis. Additionally, having the codes from WB0WIL, interfaces you to a series of 2m repeaters and this extends your effective local communications to approx. 100 mi.

If you're in St Louis, be advised this isn't a closed repeater. One of the area users is usually available and that's your connection to the code. It's not secret. We're trying to encourage utilization of this connection and if bicycle riders come to St Louis for a ride on the several area trails they'll find us anxious to provide the data you need.

Finally, if our set-up sounds good to you why not form a user's group and perhaps we all could exchange operations codes thru our BMHA newsletter.

Who knows, maybe it'll become common BMHA method across the USA to get into the Sunday net via your local remote base connection. 73's

—Don Hornberger, KA0SOH  
5841 Minnesota  
St Louis, MO 63111



## CLUBS & EVENTS

### RAGBRAI XIX A Great Success

The nineteenth running of RAGBRAI — (R)egister's (A)nnual (G)reat (B)icycle (R)ide (A)cross (I)owa — was another amazing success! Over 10,000 cyclists pedaled from the Missouri Valley to the little town of Bellvue, on the Mississippi. Our communication group had 30+ hams, all carrying their 2-meter and duo-band handhelds. Icom again sponsored us with a number of duo-banders, along with several 2-Meter mobiles. We even had a portable 440 repeater. Two motor homes and several other "rag wagons" were supporting our group.

The highlight of the event: The first public appearance of Steve Roberts, N4RVE, and his BEHEMOTH \$1.2 million bike, setting up camp with us for a few days. What a sight to behold. An amazing assemblage of hi-tech electronics and sophisticated ham gear, all carried aboard a recumbent bicycle w/trailer. (But it does weigh 350 lbs!)

RAGBRAI was 432 miles long this year, and a little more hilly than other years. The weather was perfect except for the tremendous storm the night before the first day's ride. There were complaints of lots of water coming into the tents. (However, the air conditioner running in my motor home drowned out most of the thunder and I didn't even hear all the people banging on my door trying to get in and keep dry! Sorry 'bout that, guys.)

One night the ham group was invited to stay at John's (W400) farm near Winterset, Iowa. John and the other local hams fixed us an all-time-best cookout, serving over 100 of us and our families. The pork loin roast along with all the trimmings was superb! Steve and BEHEMOTH were there and we all got a guided tour of his unbelievable machine.

The next to last day, Friday, we over-nighted at Anamosa, where the Cedar Rapids hams and their XYL's gave us another great cookout. We celebrated the previous days' rides and had a good time eating and talking, and looking forward to the last day with some reservations because it was all going to end so soon. We were delighted to see BMHA founder Hartley Alley, NAOA, and his wife Jessa, N0SOX, who had driven over from Colorado to join us. We had a great time swapping cycling stories with them.

Saturday it all ended with a 63 mile ride to Bellvue and the traditional dipping of the front wheel in the Mississippi. This was my 6th RAGBRAI. The feeling is always the same: fantastic ride, dip the wheel, take the pictures and then the letdown realizing it's all over!

Of course I'm already planning for next year and getting my gear and me in shape for RAGBRAI XXI! Keep on pedaling!

—Mike Nickolaus, NFOU  
316 E. 32nd St.  
S. Sioux City, NE 68776

## BMHA NEWSLETTER

EDITOR: Hartley Alley NAOA

BOARD OF ADVISORS: Russell Dwarshuis KB8U  
Len Koppl KD0RC, Mike Nickolaus NFOU, Bob Pulhug KE8ZJ

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We welcome articles, suggestions, announcements, letters, photos, artwork — anything pertaining to bicycling while operating an amateur radio, or vice versa!

Submitted material will be edited for clarity, and if necessary, shortened to fit space constraints. Material should be submitted before Mar 1, June 1, Sept 1, or Dec 1 for inclusion in the ensuing issue.

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## ABOUT BMHA

*For the information of our first-time readers.*

Bicycle Mobile Hams of America got its start when a "Stray" in the June '89 issue of QST asked to "get in touch with hams who operate their radios while bicycle-mobile, or while in any other human-powered conveyance", signed by Hartley Alley, NAOA.

25 hams responded, filled out questionnaires, and received a summary of the collected data.

Then in April of '90 we had our first BMHA Forum at the Dayton HamVention. We played to a packed house, overflowing the tiny room assigned to us, and adding 54 names to our mailing list. Our '91 Forum was again well-attended, and now BMHA is established as a "regular" at this annual event.

This is the fifth issue of our quarterly newsletter. In spite of the usual awkward beginning period the BMHA Newsletter has become a clearing house for the exchange of info and ideas for the hams who go on the air from their bicycles.

Since last January our paid membership has grown from 47 to 130.

## LETTERS

### Gear for Trans-Am Trip

We asked Eddy to tell us about the ham gear that he carried on his summer '90 bike ride across the US. For more see his story in the Jan '91 BMHA Newsletter. —Ed.

.....Our peers may also be interested in my equipment configuration for the trip. I used the Icom 2SAT. It's small and does everything — even has a clock on it and gets National Weather Service channels, allowing me to revel in the sound of "Severe thunderstorm watch is in effect..." Well, I heard a lot of that that summer.

I used a Lone Peak handlebar bag. The radio fit perfectly and securely into the mounting hardware at the stem. This placement precluded access to the radio keyboard, but worked out well for my needs while riding.

I probably have the only bicycle with brazed-on coax guides, and they route RG-58 neatly from the radio to a home-brew "J" antenna affixed to the rear rack.

I tried a headset/microphone combination on a trip a few years back and didn't like it. The wiring was a nuisance. Operating was nice with such a configuration, but I am typically in QSO for fifteen minutes or less during a six hour ride. Consequently, I now use a speaker/mic. This is out of the way, and easily accessible when I need it. City riding is not a problem while operating; I don't do cities.

I've never gotten around to putting together a generator or solar charging unit for the ol'cade. I think I might prefer a generator. I have one on the bike already, and would probably find solar panels cumbersome when accessing and removing the panniers. I don't think the additional drag of a generator would be of much consequence on a loaded touring bike. On the other hand, a generator might aggravate me with its attendant racket.

What I need now is a fine young ham to operate radios on the back of the tandem.

Later,

—Eddy Powell, N68PH  
"Bicycle Pedaling Ham"  
2334 Holden Court  
Oceanside, CA 92045

### Worked ZK from Bike

Dear Hartley,

Saw your "STRAY" in an '89 QST. Just a few lines to let you know that I've been operating ham radio from my bicycle on VHF bands with very good luck, plus I've also operated low-bands. When I know that I'm going for a long ride, I install a mobile low-band ant on the rear of my bicycle, and over the front wheel I have a big heavy-duty basket (that my Filipino wife Aurora loads up on Sat. mornings for the Farmers Market), and that's where I install my gelcell batts and my modified SBE transceiver. The farthest I've talked is ZK1CD on the Cook Islands, about 7,000 miles, and got a 5-6 signal report. Not too bad for a bicycle mobile, and in the PM daytime.

Now I'm trying to get enough power to operate my Icom 761 transceiver from my bike — I'm planning to use a few more gelcells in series. The 761 has (built in) an automatic antenna tuner and an SWR meter, and because of that we've been loading it up to just about everything and it works just fine.

I've also operated low-bands from my 550cc motorcycle with good results. But until I strapped a mike (stick) around my neck it was kinda dangerous holding the mike in one hand and steering with other. Drop me a few lines about your bicycle-mobile experiences. 73's.

—Emmy Mahoney, K6OPG  
San Francisco, CA

### Finding & Cultivating New Hams

If you haven't thought of this, go now to the phone and call your local grade school principal and arrange to have a chat.

First, advise this person you'd like to do some volunteering, at no cost or aggravation to the school. Explain what an amateur radio club is. Have an HT with you to demonstrate a few easy 2 meter contacts, etc.

Advise this administrator how nice it would be for the community to see the kids get involved with a harmless computer-related hobby that introduces technology to even those youths of questionable skill.

Get the principal to allow you to work with a teacher step by step. Get the teacher's attention by showing how your

radio works into a local repeater. Maybe bring up a phone patch and make a phone call to the teacher's spouse. Perhaps, even let the teacher talk using your radio and you as control operator. Get the teacher to allow you to talk to the class and do an actual demonstration.

Make the obvious connection of bicycling and radio for the kids. Recruit. Provide opportunities. Bicycles, kids, radio mobile — it's a natural. You'll be getting thank-you cards for decades.

—Donn Hornberger, KA0SOH  
5841 Minnesota  
St Louis, MO 63111

### From a Skinny Tire Man

Dear Hartley,

Thank you for the sample news letter. Enclosed is my check for dues and a little extra for postage.

To answer your questionnaire, I have an advanced license and my call is KE0WL. I am 61 (really 39) and am retired. Once when I was in high school I rode 200 miles one day, but lately the most I've done is a century. If you are willing to do a news letter I'll read it and help pay. A BMHA rally sounds like a great idea. I would try very hard to check into the BMHA net if available.

For bike mobile I use an HT with a speaker mike. A piece of sheet iron bent to fit over my back carrier holds my mag mount antenna.

I consider myself a skinny tire, hard road biker and look with disdain at those who race through the hills terrifying back packers and crushing wild flowers under their harsh nobby tires.

I usually check into the Colorado morning weather net.

73 and best wishes,

—Ted Miller, KE0WL  
Hugoton, KS



# ANTENNAS

## Solving the Ground Plane Problem—With Copper Tubing

Various approaches have been offered to solving the ground plane problem on bicycles. When the radiating element is a quarter-wave whip over the ground plane, that approach has one major drawback however. The radiating element is placed low in height, probably at about the same height as the torso. So your transmitting antenna has a partly obstructed view of the horizon.

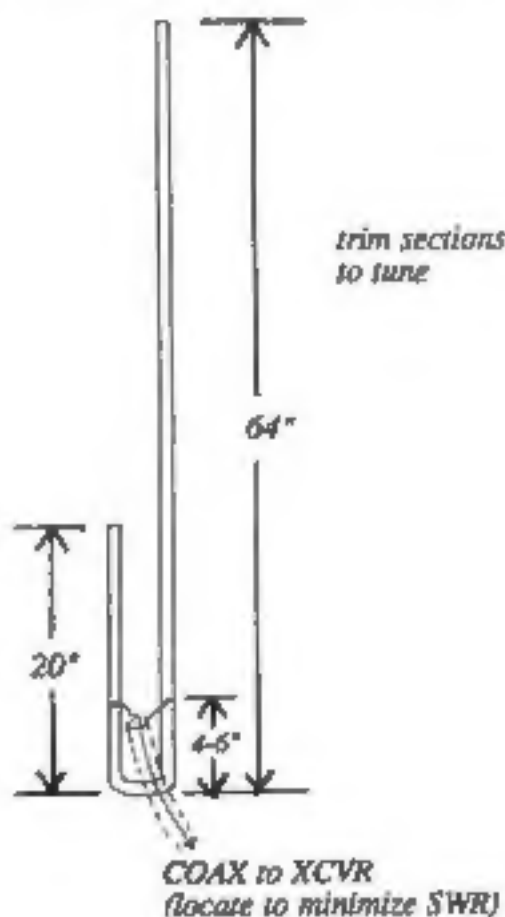
A better approach to the ground plane problem is to use the J-pole antenna. It has at least two advantages over the quarter-wave ground-plane antenna on your bicycle. One is that it needs no ground plane at all! Secondly, the radiating element is a half-wave long, and the bottom of it is about as high as the top of the quarter-wave would have been, thus freeing the signal from torso interference.

The J-pole consists of a three-quarter-wave section shorted to a quarter-wave section at the bottom. It can be made of half-inch copper tubing soldered with elbows and capped at the top. The coax feedline is located with the braid connected to the longer section and the inner conductor to the shorter one. Feed position is adjusted up or down for minimum SWR and then soldered. Start with the sections an inch or so too long and cut to locate the minimum SWR in the band where you want it.

A simple solution to the mounting problem is suggested. Extend the long section with copper about six inches below the junction between antenna sections. A copper "tee" works well for this. Insert your copper extension into an eight-inch piece of plastic pipe which is attached with hose clamps to a backrack axle-mounted bracket.

—David A. Cornell, K9BO  
2 Oakwood Drive  
Elsah, IL 62028

## J-Pole Antenna for Two Meters



## MEMBERSHIP APPLICATION

### BICYCLE MOBILE HAMS OF AMERICA (BMHA)

Please complete and return to:

BMHA  
Box 4009  
Boulder, CO 80306

Date \_\_\_\_\_

Name \_\_\_\_\_ Call \_\_\_\_\_ License Class \_\_\_\_\_

Address \_\_\_\_\_

City, State \_\_\_\_\_ Zip \_\_\_\_\_

Membership Fee: \$10 per year Family Membership: \$15  
(Make checks payable to BMHA, Bicycle Mobile Hams of America)

(check one) New Member \_\_\_\_\_ Renewal \_\_\_\_\_ Enclosed is my check for \$ \_\_\_\_\_

## ANNUAL FORUM REPORT

The second annual Forum of the BMHA was held on Sunday April 28th, at 10:30 at the Dayton HamVention. With Hartley, NAOA, BMHA's founder and chairman, being absent because of his March surgery, I was pressed into service to conduct the meeting.

This year's meeting was again well attended in spite of the disadvantage of having our Forum scheduled on a Sunday. About 65 hams showed up, all very much interested in both radio and bicycling, as was evident by the comments and ideas that they contributed. The meeting was of an open forum type, where questions could be asked and information exchanged as each major topic was discussed.

Mike, NF0N, our net control, conducted a discussion regarding the Sunday evening BMHA HF net. In addition he showed a video of member Steve Roberts, N4RVE, and his famous million dollar recumbent bike. Next we had volunteer speakers come forward and demonstrate innovations and equipment that they use while bicycle-mobile: Jim, NC8Y, his car-mic and its advantages; Woody, K9IFG, a helmet-mounted micenna; Rich, N9EX, antenna ideas using a ground plane; Jim, NU8N, more ideas on helmet-mounted antennas.

I think this second meeting of BMHA was a great success in that we had a chance to meet face to face, exchange ideas and help one another. The only problem for me was that there was not enough time to meet each of you and learn the many different ways you have of combining hamming with cycling. We welcome your suggestions for the format of next year's BMHA Forum at the Dayton HamVention. Please send them to Hartley or me. 73s.

—Bob Paduj, KEBZJ  
POB 11429  
Toledo, OH 43611

## BMHA NEWSLETTER

Bicycle Mobile Hams of America  
PO Box 4009  
Boulder, CO 80306

*Address Correction Requested*

**First Class Mail**

## QSL CORNER

*In this space we feature QSL cards that have a bicycle-mobile motif. Send yours in. We'll run it.*



## CONTACT

*This is a new department in the BMHA Newsletter, the object being to establish a clearing house where our readers can exchange information on a one-on-one basis. Send in your request — we'll run it.*

"I'd like to get in touch with any BMHA members who are USCP bicycle racers."

Hank Blackstock, WA5JRH 405 736 0136  
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Oklahoma City, OK 73156